

a container containing at least one polynucleotide selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, and SEQUENCE ID NO: 12.

And E1
75. (New) A purified polynucleotide selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, and SEQUENCE ID NO: 12.

76. (New) The purified polynucleotide of claim 75, wherein said polynucleotide is produced by recombinant techniques.

77. (New) The purified polynucleotide of claim 75, wherein said polynucleotide is produced by synthetic techniques.

78. (New) A recombinant expression system comprising:
a nucleic acid sequence that includes an open reading frame operably linked to a control sequence compatible with a desired host selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, and SEQUENCE ID NO: 12.

79. (New) A cell transfected with the recombinant expression system of claim 78.

80. (New) A composition of matter comprising a polynucleotide selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, and SEQUENCE ID NO: 12.

81. (New) The test kit of claim 74 further comprising:
a container with tools useful for collection of said sample, wherein the tools are selected from the group consisting of lancets, absorbent paper, cloth, swabs and cups.

82. (New) A purified polynucleotide which codes for a protein having an amino acid sequence over the entire length of SEQUENCE ID NO: 25.

83. (New) A purified polynucleotide comprising DNA selected from the group consisting of: SEQUENCE ID NO: 11 and SEQUENCE ID NO: 12.

84. (New) A test kit useful for detecting polynucleotide in a test sample, comprising:
a container containing at least one purified polynucleotide selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, SEQUENCE ID NO: 12 and degenerate codon equivalents thereof.

85. (New) The test kit of claim 84 further comprising:
a container with tools useful for collection of said sample, wherein the tools are selected from the group consisting of lancets, absorbent paper, cloth, swabs and cups.

And 85
86. (New) An isolated DNA molecule consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, SEQUENCE ID NO: 12 and equivalent degenerate codon sequences thereof.

87. (New) The isolated DNA molecule of claim 86 wherein the DNA molecule is produced by recombinant techniques.

88. (New) The isolated DNA molecule of claim 86 wherein the DNA molecule is produced by synthetic techniques.

And 86
89. (New) A recombinant expression system comprising:
a purified nucleic acid sequence that includes an open reading frame operably linked to
a control sequence compatible with a desired host, wherein the purified nucleic acid is selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, SEQUENCE ID NO: 12 and degenerate codon equivalents thereof.

90. (New) A cell transfected with the recombinant expression system of claim 89.

And 87
91. (New) A recombinant expression system comprising:
an isolated DNA molecule that includes an open reading frame operably linked to a control sequence compatible with a desired host, wherein the isolated DNA molecule is selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2,

And
92

SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, SEQUENCE ID NO: 12 and degenerate codon equivalents thereof.

92. (New) A cell transfected with the recombinant expression system of claim 91.

93. (New) A composition of matter comprising an isolated DNA molecule selected from the group consisting of SEQUENCE ID NO: 1, SEQUENCE ID NO: 2, SEQUENCE ID NO: 3, SEQUENCE ID NO: 4, SEQUENCE ID NO: 5, SEQUENCE ID NO: 6, SEQUENCE ID NO: 7, SEQUENCE ID NO: 8, SEQUENCE ID NO: 9, SEQUENCE ID NO: 10, SEQUENCE ID NO: 11, and SEQUENCE ID NO: 12.

94. (New) A purified polynucleotide sequence encoding a polypeptide having an amino acid sequence selected from the group consisting of SEQUENCE ID NO: 25, SEQUENCE ID NO: 26, SEQUENCE ID NO: 27, SEQUENCE ID NO: 28, SEQUENCE ID NO: 29 and degenerate codon equivalents thereof.

95. (New) A purified polynucleotide sequence which codes for a protein having an amino acid sequence corresponding to SEQUENCE ID NO: 25 and degenerate codon equivalents thereof.

REMARKS

The Examiner has rejected claims 45, 57, 63, 68, 69 and 70 under 35 U.S.C. 112, first paragraph stating that the specification does not provide enablement for polynucleotides having 95% identity over the length of SEQUENCE ID NO: 1,